U.S. ENVIRONMENTAL PROTECTION AGENCY POLLUTION/SITUATION REPORT

Santa Clara Wastewater Treatment Plant Emergency Response - Removal Polrep



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY Region IX

Subject: POLREP #6

Progress

Santa Clara Wastewater Treatment Plant Emergency Response

Santa Paula, CA

Latitude: 34.3144538 Longitude: -119.1024780

To: Harry Allen, EPA Region 9

Kathleen Salyer, EPA Region 9 Enrique Manzanilla, EPA Region 9

From: Martin Powell, OSC

Date: 1/5/2015

Reporting Period: 12/29/2014-01/02/2015

1. Introduction

1.1 Background

Site Number: A973 Contract Number: D.O. Number: Action Memo Date:

Response Authority: CERCLA Response Type: Emergency

Response Lead: EPA Incident Category:

NPL Status: Non NPL Operable Unit:

Mobilization Date: 11/18/2014 **Start Date:** 11/18/2014

Demob Date: Completion Date:

CERCLIS ID: CAN000900238 RCRIS ID:

ERNS No.: State Notification:

FPN#: Reimbursable Account #:

1.1.1 Incident Category

Emergency Response

1.1.2 Site Description

The incident began at approximately 3:30 am on November 18, when a vacuum truck exploded. Reports vary as to what activities lead up to the explosion (one suggested that the operator had begun aggregating wastes from totes at the facility into the vac truck). A fire ensued, eventually involving several waste streams, including oxidizers, acids, polymerizing agents, and possibly chlorine tablets. It is not clear what was in the vac truck when the explosion began. The secondary containment filled with a watery sludge from the mixed chemicals.

Almost immediately, fine crystals formed on the drying surfaces from the chemical mix; these were found to be shock sensitive, and the VCFD experienced a couple of incidents of sparks and small explosions from walking on the crystals. VCFD Haz Mat indicated that all tests on the crystals indicated an organic peroxide. VCFD and Santa Paula fire each abandoned one firefighting rig in the facility due to contamination with shock-sensitive organic peroxide. The Ventura County Sheriff conducted an evacuation out to a distance of one half mile and a shelter in place advisory was issued to residents located up to three miles downwind.

1.1.2.1 Location

815 Mission Rock Road, Santa Paula, CA 93060

1.1.2.2 Description of Threat

The fire has been extinguished, although a significant smoke plume/gas cloud was observed to leave the site.

The following inventory summarizes chemicals reported to be on the site prior to the fire. It is believed that other unknown chemicals were also present.

Common Name Maximum Amount Onsite motor oil 110 gallons oxygen 1,000 cubic feet acetylene 600 cubic feet potassium permanganate 1,500 pounds diesel fuel 500 gallons 1,980 gallons 320-L polymer 460-TC polymer 660 gallons chlorine tablets 2,750 tablets 3,300 gallons hydrogen peroxide 3,300 gallons soda ash sodium hypochlorite 990 gallons aluminum chloride 1,650 gallons 2,750 gallons anionic polymer 110 gallons defoamer emulsion breaker 110 gallons 3,300 gallons ferric sulfate sulfuric acid 93-99% 660 gallons used motor oil 110 gallons. used motor oil filters 100 gallons

1.1.3 Preliminary Removal Assessment/Removal Site Inspection Results

Due to the nature of the hazards onsite, the site assessment process is running in parallel with cleanup/neurtalization operations. While the specific chemicals of concern are unknown, the driving hazardous are pH and oxidizers. The oxidizers are shock sensitive, erupt in a flash of fire, and are pervasive onsite. Therefore neutralization efforts are employeed prior to assessment, with assessment serving as confirmation of successfull neutralization. This process continues as areas of the site are cleared, thus allowing access to the uncontained mixture of chemicals located in the center of the site. Traditional offsite laboratory analysis is currently unavailable due to the hazard that samples pose to the lab equipment and personnel. The stabilization alternative choosen for the ponded chemical mixture on site involves mixing with powdered stone and fine gravel.

2. Current Activities

2.1 Operations Section

2.1.1 Narrative

2.1.2 Response Actions to Date

12-29-2014 Day 46

Solidification activities in Sectors E2/B2 continued, with a focus on clearing access paths to the Patriot 70-barrel vacuum truck and the SCWW 70-barrel vacuum truck which still remain in the pond area. A plan was created by CTEH/Patriot to sample the material in both 70-barrel vacuum trucks. Sampling and HAZCAT activities on the material are scheduled for 12/30.

SCWW's consultant, Haley and Aldrich, requested that CTEH inventory all the empty totes on Site. That operation is expected to begin on 12/30.

Patriot and CTEH personnel worked with the Ventura County fire department to segregate porous and non-porous materials on Engine 26. Porous materials will be bagged and disposed of while non-porous materials will swipe tested prior to releasing the engine from the site.

Analytical results for stockpiled solidified waste was received at 18:30. Ventura County Environmental Health reviewed the results and agreed with Patriot/CTEH that the stockpiled solidified waste that was analyzed could be disposed of as "non-hazardous" material.

12-30-2014 Day 47

Patriot and CTEH conducted sampling of the SCWW and Patriot 70-barrel trucks which are still in the pond area at E2/B2. Sampling was done in modified Level C PPE with ThermoPro protective suits. Three inch hoses with sample valves were attached to the access ports on the rear of both vehicles. Adequate sample volumes were collected from both trucks. HAZCAT analyses were conducted on the material and results were found to be consistent with sewage waste stored on site. The 70-barrel trucks were then vacuumed out and the material was consolidated in sewage storage tanks on the site. Approximately 1,000 gallons of material were removed in total from both trucks. The SCWW truck was neutralized with sodium sulfite solution and then pressure washed. The truck will be moved out of the pooled area on 12/31. Stockpiling of solidified waste continued in the pond area at Sector E2/B2. Ventura County Fire Department returned to the Site to oversee swipe sampling of non-porous material on Engine 26. Activities will continue on 1/5. Analytical results for solidified waste which has been staged in soil bins on site was received at 19:00. Ventura County Environmental Health reviewed and agreed with Patriot/CTEH that the solidification material in bins could be disposed of as "non-hazardous" material. Trucks will begin transporting stockpiled solidified waste on 12/31 for disposal.

12-31-2014 Day 48

Six transport trucks with tarp covers began transporting stockpiled solidified waste to Chiquita Canyon Landfill starting at 06:00. In total, 38 loads of solidified waste were delivered to the landfill for disposal. Consolidation of stockpiled solidified waste was conducted by Patriot. Stockpiled solidified waste was transported from Sector B2 to Sector E2.CTEH completed the inventory of empty totes on the Site. In total, CTEH has identified and documented 64 totes of various materials and volumes found throughout the facility. An additional unlabeled tote of material was found in Sector C3. CTEH will access it and conduct HAZCAT tomorrow. The SCWW vacuum truck was removed from Sector D2 and staged in Sector F2. Further decontamination of the truck and swipe sampling will continue on the truck.

01-01-2015 Day 49

Chiquita Canyon Landfill is closed today, so no solidified waste will leave site. Consolidation of the stockpiled material continues on the site. Stockpiled solidified waste was moved from Sector B2 to Sector E2 throughout the day. The Patriot 70-barrel vacuum truck located in the pool area was neutralized with the sodium sulfite solution. Oxidizer and pH swipe tests conducted on the rear of the vacuum truck were found to be positive for oxidizer. Additional neutralization will be conducted on the truck prior to moving it from the pooled area. A sample was collected from the unidentified tote in Sector C3 and submitted for HAZCAT analysis. The material was found to have a pH of 4. It was assigned a number and added to the site container inventory. Patriot/CTEH proposed a plan for the scaling back of community air monitoring based on past results and changes in operations. Perimeter and site air monitor will continue. Ventura County Environmental Health and US EPA reviewed the submitted plan and approved.

01-02-2015 Day 50

Twelve transport trucks were on site to continue transporting stockpiled solidified waste off-site to Chiquita Canyon Landfill. A total of 82 loads of solidified waste were removed today for disposal. The Patriot 70-barrel vacuum truck was further neutralized with sodium sulfite. The truck was then power washed and swipe tested for oxidizer and pH.Solidification activities continued in Sectors C3 and D2. **2.1.3 Enforcement Activities, Identity of Potentially Responsible Parties (PRPs)**

OSC Powell has provided verbal notice to the PRP's legal counsel on 11/24/2014, and to the PRP on 11/25/2014. A NFRA was issued to the Plant's Operation Manager on 11/26/2014. On 11/28/2014 the Plant's Operation Manager stated that the NFRA had been provided to the PRP. A signature memorializing receipt of NFRA was received on 12/07/2014.

2.2 Planning Section

2.2.1 Anticipated Activities

Conduct all work in a safe manner
Continue to evaluate contamination of the facility
Continue to evaluate any offsite impacts
Continue to decontaminate trucks and apparatus that inhibit safe access to work areas
Continue cleanup of facility, and initiate treatment/disposal of waste material
Continue to keep the community and response partners informed of site activities
Prepare for rain events

2.2.1.1 Planned Response Activities

2.2.1.2 Next Steps

Temporarily suspend site operations, and return rested on 12/28/2014. Continue stabilization efforts, and disposal activities.

2.2.2 Issues

2.3 Logistics Section

No information available at this time.

2.4 Finance Section

No information available at this time.

2.5 Other Command Staff

2.5.1 Safety Officer

2.5.2 Liaison Officer

2.5.3 Information Officer

Public affairs are being handled by Ventura County OES and FD.

EPA does not have a PIO onsite. Nahal Mogharabi is serving as the EPA PIO from a remote location and will provide onsite support if requested.

3. Participating Entities

3.1 Unified Command

Santa Clara Wastewatere Treatment, EPA and Ventura County Environmental Health

3.2 Cooperating Agencies

Ventura County Fire Ventura County Sheriff Santa Paula Fire Ventura County Agricultural Commission U.S. Food and Drug Administration CA Department of Public Health, Food and Drug Branch CA OSHA

4. Personnel On Site

No information available at this time.

5. Definition of Terms

No information available at this time.

6. Additional sources of information

No information available at this time.

7. Situational Reference Materials

No information available at this time.